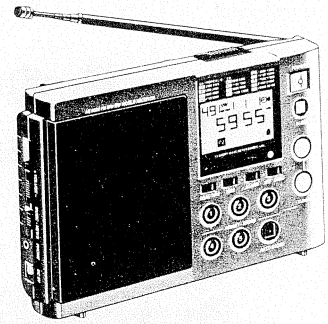
Portable radio AE3625/00/17/18

Service
Service
Service



ServiceManual

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"Pour votre sécurité, ces documents doivent être utilisés par des spécialistes agréés, seuls habilités à réparer votre appareil en panne".

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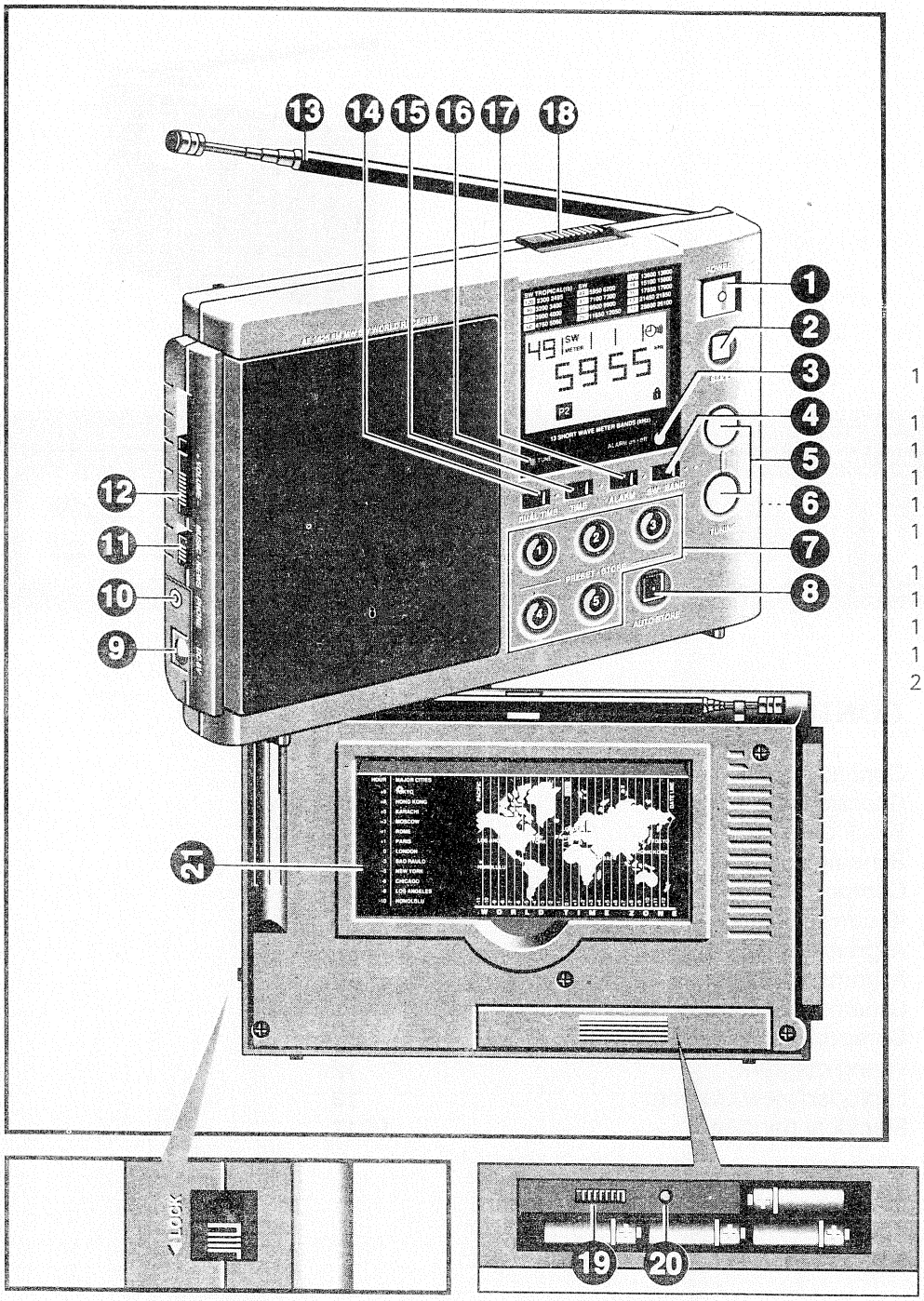
PHILIPS

CONNECTION AND CONTROLS



1. POWER button
2. SLEEP button
3. ALARM ON/OFF button
4. SW band selection button
5. TUNING up/down button
6. LOCK switch
7. PRESET buttons
8. AUTOSTORE button
9. External DC socket
10. PHONES socket
11. MUSIC/NEWS switch
12. VOLUME control
13. Telescopic aerial
14. DUAL TIME button
15. TIME set button
16. Tuning indicator
17. ALARM set button
18. BAND selector
19. 9/10 kHz selector
20. RESET button

(GB)
Safety regulations require that the set be restored to its original condition and that parts which are identical with those specified be used.

(NL)
Veiligheidsbepalingen vereisen, dat het apparaat in zijn oorspronkelijke toestand wordt teruggebracht en dat onderdelen, identiek aan de gespecificeerde worden toegepast.

(SF)
Laitteen käyttäminen muulla kuin tässä käyttöohjeessa mainitulla tavalla saattaa altistaa käyttäjän turvallisuusluokan 1 ylittävälle näkymättömälle lasersäteilylle.

(D)
Bei jeder Reparatur sind die geltenden Sicherheitsvorschriften zu beachten. Der Originalzustand des Geräts darf nicht verändert werden für Reparaturen sind Original-Ersatzteile zu verwenden.

(I)
Le norme di sicurezza esigono che l'appareccio venga rimesso nelle condizioni originali e che siano utilizzati pezzi di ricambiago identici a quelli specificati.

(S)
Om apparaten används på annat sätt än i denna bruksanvisning specificerats, kan användaren utsättas för osynlig laserstrålning, som överskider gränsen för laserklass 1.

(F)
Les normes de sécurité exigent que l'appareil soit remis à l'etat d'origine et que soient utilisées les pièces de rechange identiques à celles spécifiées.

SPECIFICATIONS

GENERAL

Supply voltage	:	6 V (R06 x 4)
Current consumption	:	160 mA
	:	< 1 mA (radio off)
Battery lifetime	:	12 hours
Output power	:	300 mW
Clock accuracy	:	< 2 sec/day

FM section

Tuning range	:	87.5 - 108 MHz
Tuning step	:	50/100 kHz switchable
IF frequency	:	10.7 MHz
Sensitivity	:	< 24 dBf at 26dB S/N
Search sensitivity	:	< 43 dBf
Selectivity	:	> 20 dB at 600kHz B.W.
IF rejection	:	> 60 dB
Image rejection	:	> 20 dB

AM section

Tuning range	MW	:	522 - 1620 kHz (9 kHz/step)
			520 - 1710 kHz (10 kHz/step)
	TB	:	2.3 - 5.06 MHz (-/00,-/17)
	LW	:	148 - 284 kHz (-/18)
	SW1	:	21.45 - 26.10 MHz (11-13 m)
	SW2	:	13.60 - 17.90 MHz (16-22 m)
	SW3	:	9.05 - 12.05 MHz (25-31 m)
	SW4	:	5.95 - 7.30 MHz (41-49 m)
Tuning step	MW	:	9/10 kHz switchable
	LW	:	1 kHz
	TB/SW	:	1 kHz (manual)
			5 kHz (auto)
IF frequency		:	450 ± 1 kHz
Sensitivity	MW	:	< 4500 μV/m 26dB S/N
	LW	:	< 6300 μV/m
	TB	:	< 3200 μV/m
	SW3-4	:	< 50 μV
	SW1-2	:	< 60 μV
Selectivity		:	> 16 dB
IF rejection	MW	:	> 34 dB
	LW	:	> 40 dB
	SW	:	> 40 dB
Image rejection	MW	:	> 28 dB
	LW	:	> 28 dB
	SW3-4	:	> 16 dB
	SW1-2	:	> 6 dB

(GB) WARNING

All ICs and many other semi-conductors are susceptible to electrostatic discharges (ESD). Careless handling during repair can reduce life drastically.
When repairing, make sure that you are connected with the same potential as the mass of the set via a wrist wrap with resistance.
Keep components and tools also at this potential.

ESD

(NL) WAARSCHUWING

Alle IC's en vele andere halfgeleiders zijn gevoelig voor electrostatische ontladingen (ESD).
Onzorgvuldig behandelen tijdens reparatie kan de levensduur drastisch doen verminderen.
Zorg ervoor dat u tijdens reparatie via een polsband met weerstand verbonden bent met hetzelfde potentiaal als de massa van het apparaat.
Houd componenten en hulpmiddelen ook op ditzelfde potentiaal.

(F) ATTENTION

Tous les IC et beaucoup d'autres semi-conducteurs sont sensibles aux décharges statiques (ESD).
Leur longévité pourrait être considérablement écourtée par le fait qu'aucune précaution n'est prise à leur manipulation.
Lors de réparations, s'assurer de bien être relié au même potentiel que la masse de l'appareil et enfiler le bracelet serti d'une résistance de sécurité.
Veiller à ce que les composants ainsi que les outils que l'on utilise soient également à ce potentiel.

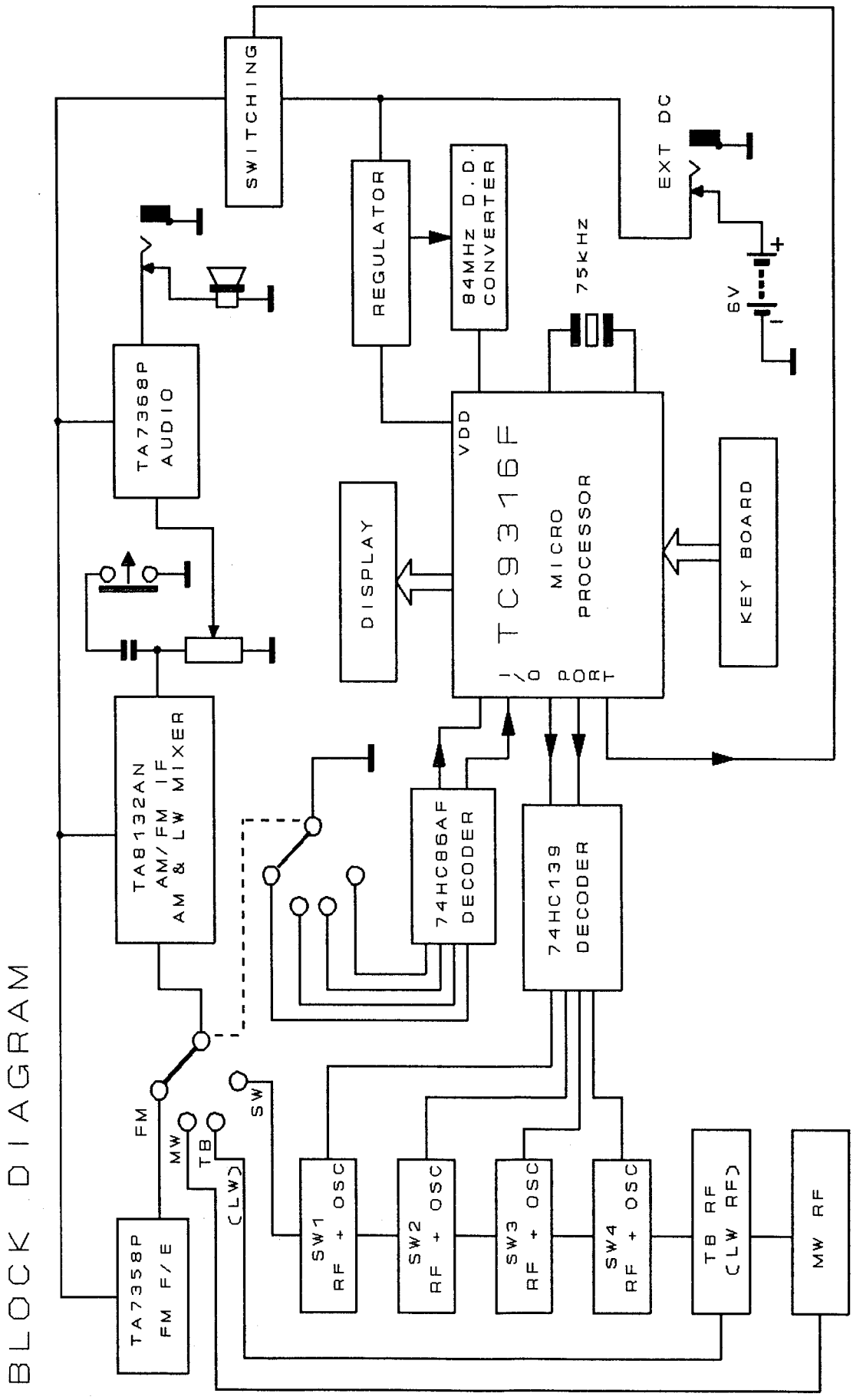
(D) WARNUNG

Alle ICs und viele andere Halbleiter sind empfindlich gegenüber elektrostatischen Entladungen (ESD).
Unsorgfältige Behandlung im Reparaturfall kan die Lebensdauer drastisch reduzieren.
Veranlassen Sie, dass Sie im Reparaturfall über ein Pulsarmband mit Widerstand verbunden sind mit dem gleichen Potential wie die Masse des Gerätes.
Bauteile und Hilfsmittel auch auf dieses gleiche Potential halten.

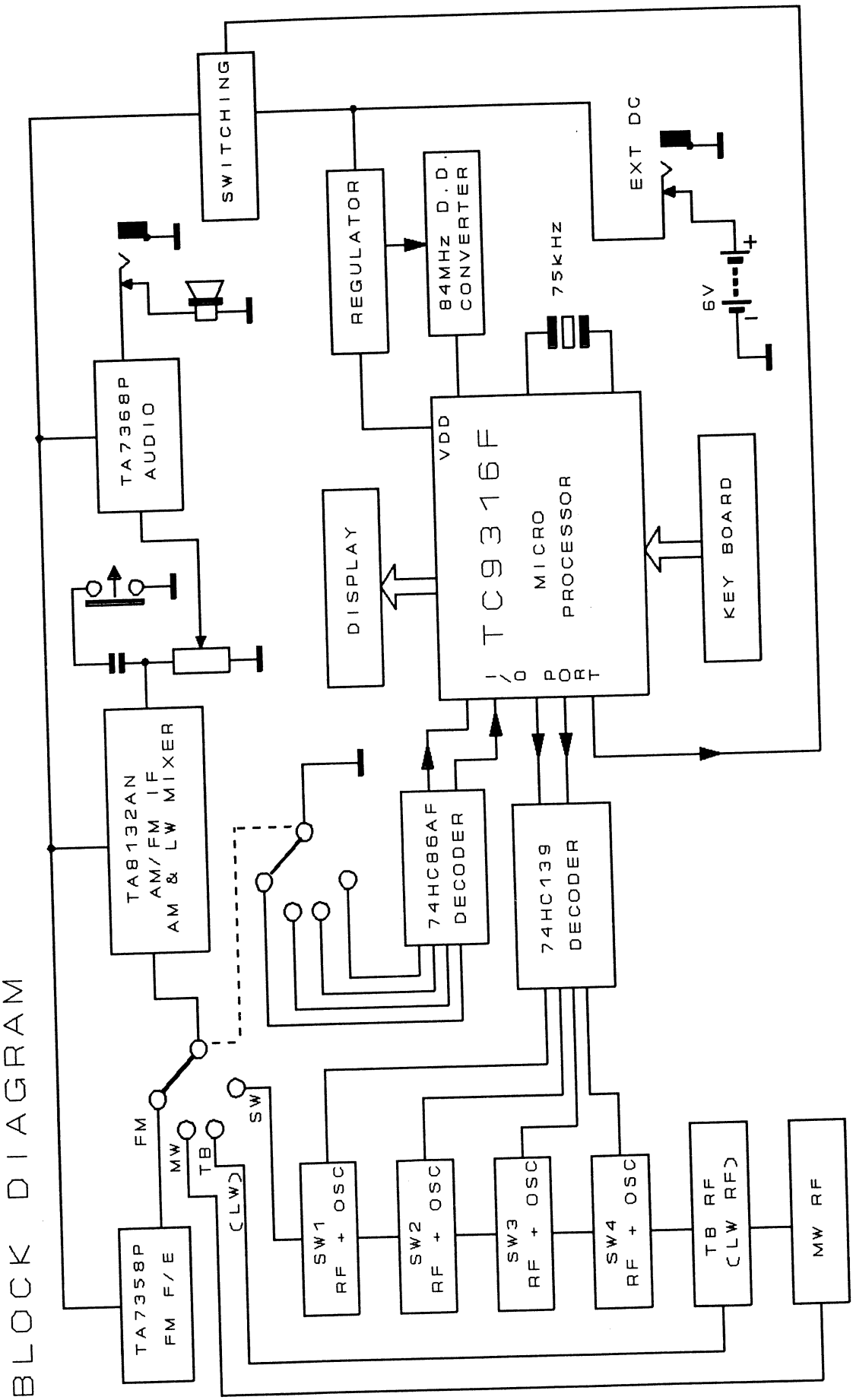
(I) AVVERTIMENTO

Tutti IC e parecchi semi-conduttori sono sensibili alle scariche statiche (ESD).
La loro longevità potrebbe essere fortemente ridatta in caso di non osservazione della più grande cauzione alla loro manipolazione.
Durante le riparazioni occorre quindi essere collegato allo stesso potenziale che quello della massa dell'apparecchio tramite un braccialetto a resistenza.
Assicurarsi che i componenti e anche gli utensili con quali si lavora siano anche a questo potenziale.

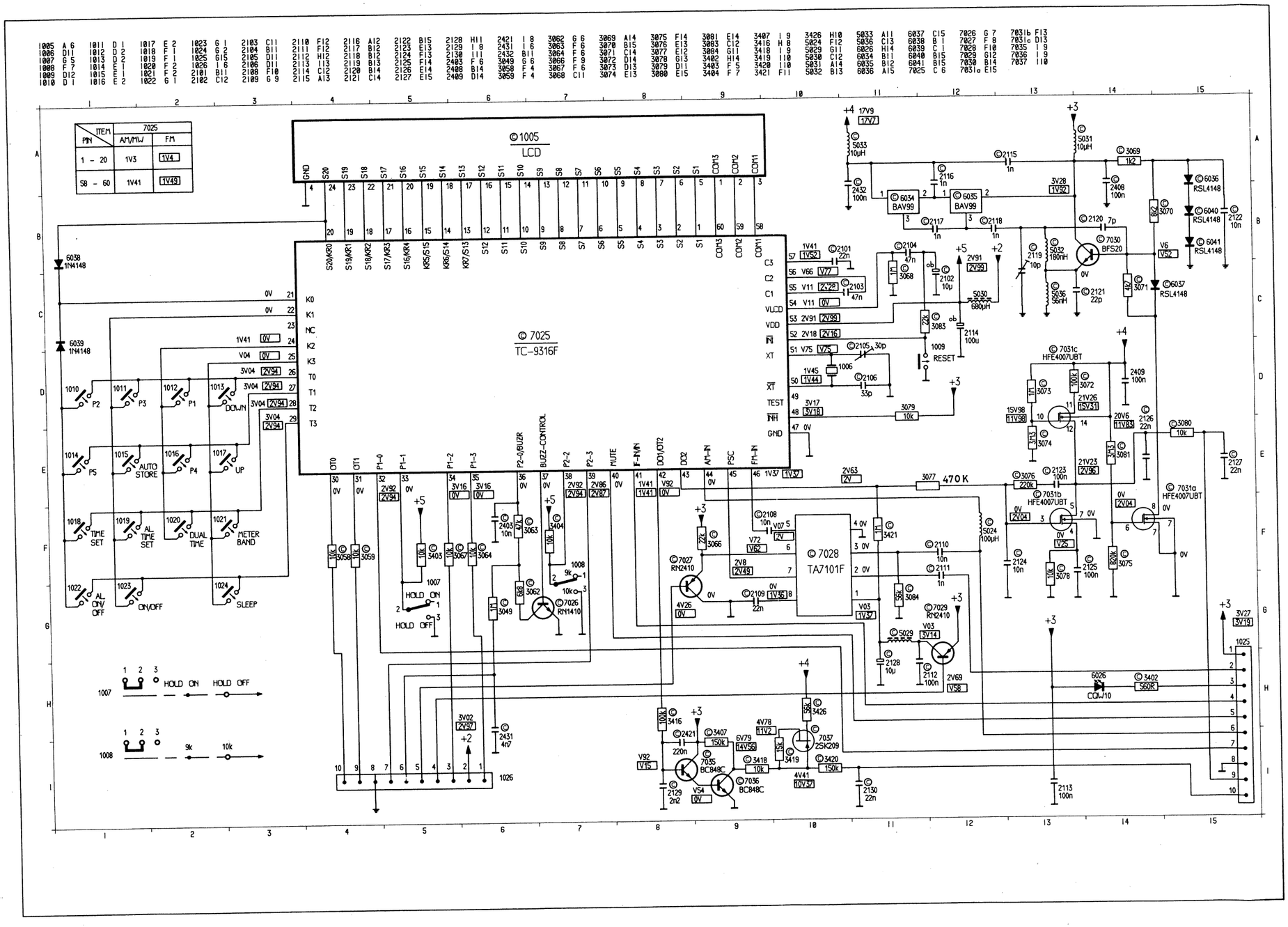
BLOCK DIAGRAM

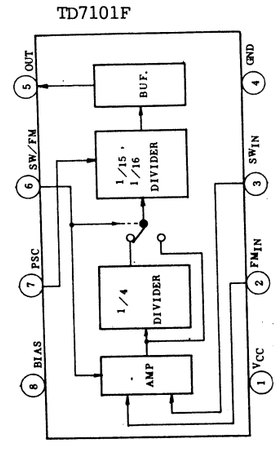


BLOCK DIAGRAM



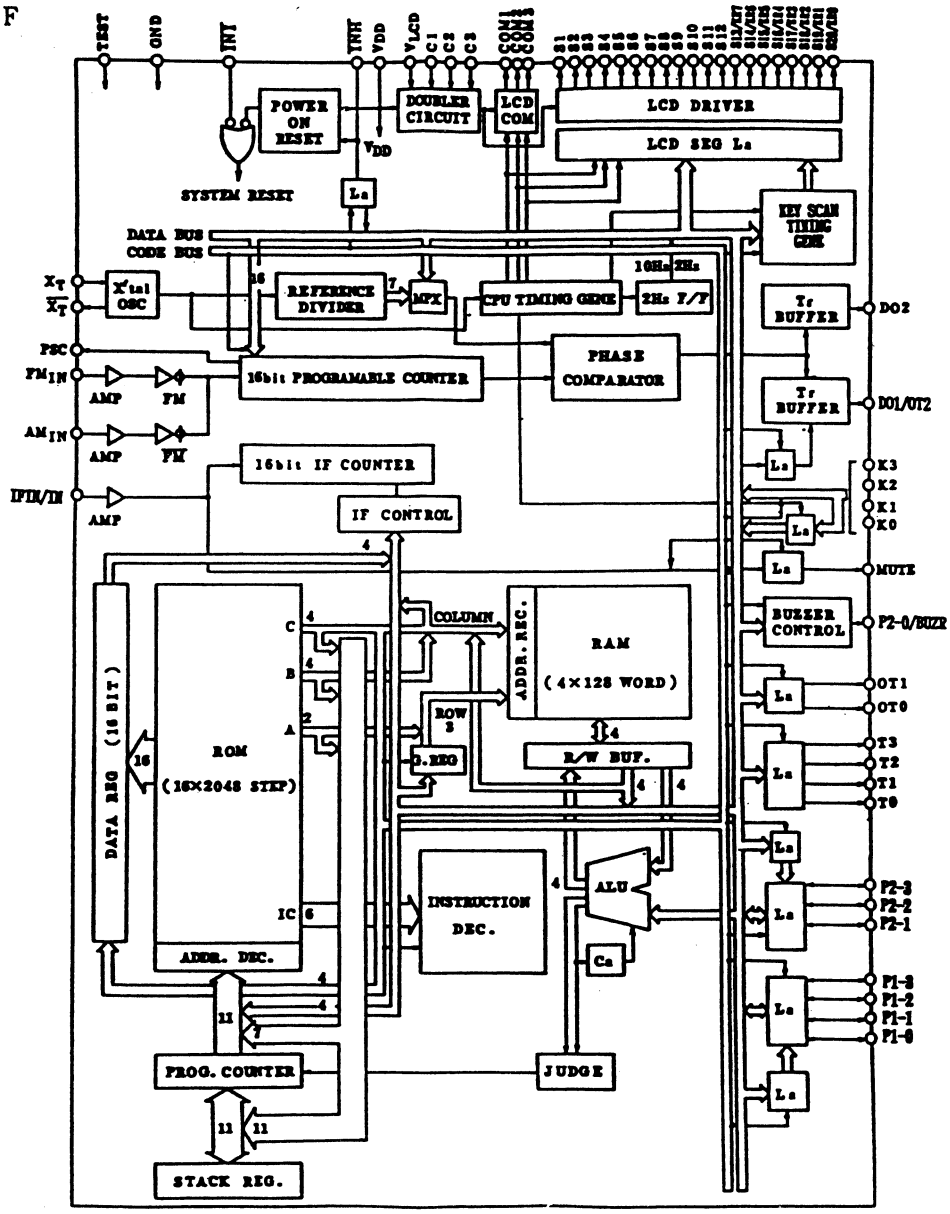
SCHEMATIC DIAGRAM - CONTROL

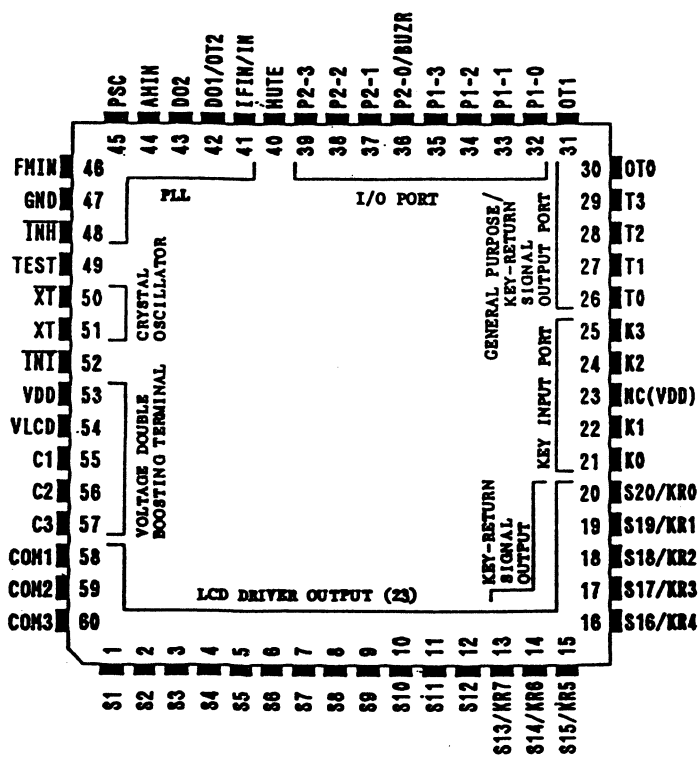




COMPONENTS LAYOUT - CONTROL

| | | |


TEST
GND
INT
INH
VDD
VLCD
C1
C2
C3
COM1
COM2
COM3
S1
S2
S3
S4
S5
S6
S7
S8
S9
S10
S11
S12/KR7
S13/KR6
S14/KR5
S15/KR4
POWER ON RESET
SYSTEM RESET
DOUBLER CIRCUIT
LCD COM
LCD DRIVER
LCD SEG La
KEY SCAN TIMING GENE
DATA BUS
CODE BUS
X'tal OSC
REFERENCE DIVIDER
MPX
CPU TIMING GENE
16Hz 2Hz
2Hz F/F
Tr BUFFER
DO2
PSC
FMIN
AMIN
AMP
FM
16bit PROGRAMABLE COUNTER
PHASE COMPARATOR
DO1/OT2
16bit IF COUNTER
IFIN/IN
IF CONTROL
K3
K2
K1
K0
MUTE
BUZZER CONTROL
P2-0/BUZR
COLUMN
ADDR. REC.
RAM
(4×128 WORD)
ROW
D. REG
R/W BUF.
OT1
OT0
T3
T2
T1
T0
DATA REG (16 BIT)
ROM
(16×2048 STEP)
INSTRUCTION DEC.
ALU
Ca
P2-3
P2-2
P2-1
P1-3
P1-2
P1-1
P1-0
ADDR. DEC.
PROG. COUNTER
JUDGE
STACK REG.


PSC
AMIN
DO2
DO1/OT2
IFIN/IN
MUTE
P2-3
P2-2
P2-1
P2-0/BUZR
P1-3
P1-2
P1-1
P1-0
OT1
FMIN
GND
INH
TEST
XT
XT
INI
VDD
VLCD
C1
C2
C3
COM1
COM2
COM3
OT0
T3
T2
T1
T0
K3
K2
NC(VDD)
K1
K0
S20/KR0
S19/KR1
S18/KR2
S17/KR3
S16/KR4
S1
S2
S3
S4
S5
S6
S7
S8
S9
S10
S11
S12
S13/KR7
S14/KR6
S15/KR5
PLL
I/O PORT
CRYSTAL OSCILLATOR
VOLTAGE DOUBLE BOOSTING TERMINAL
GENERAL PURPOSE/ KEY-RETURN SIGNAL OUTPUT PORT
KEY INPUT PORT
KEY-RETURN SIGNAL OUTPUT
LCD DRIVER OUTPUT (23)

RADIO ALIGNMENT

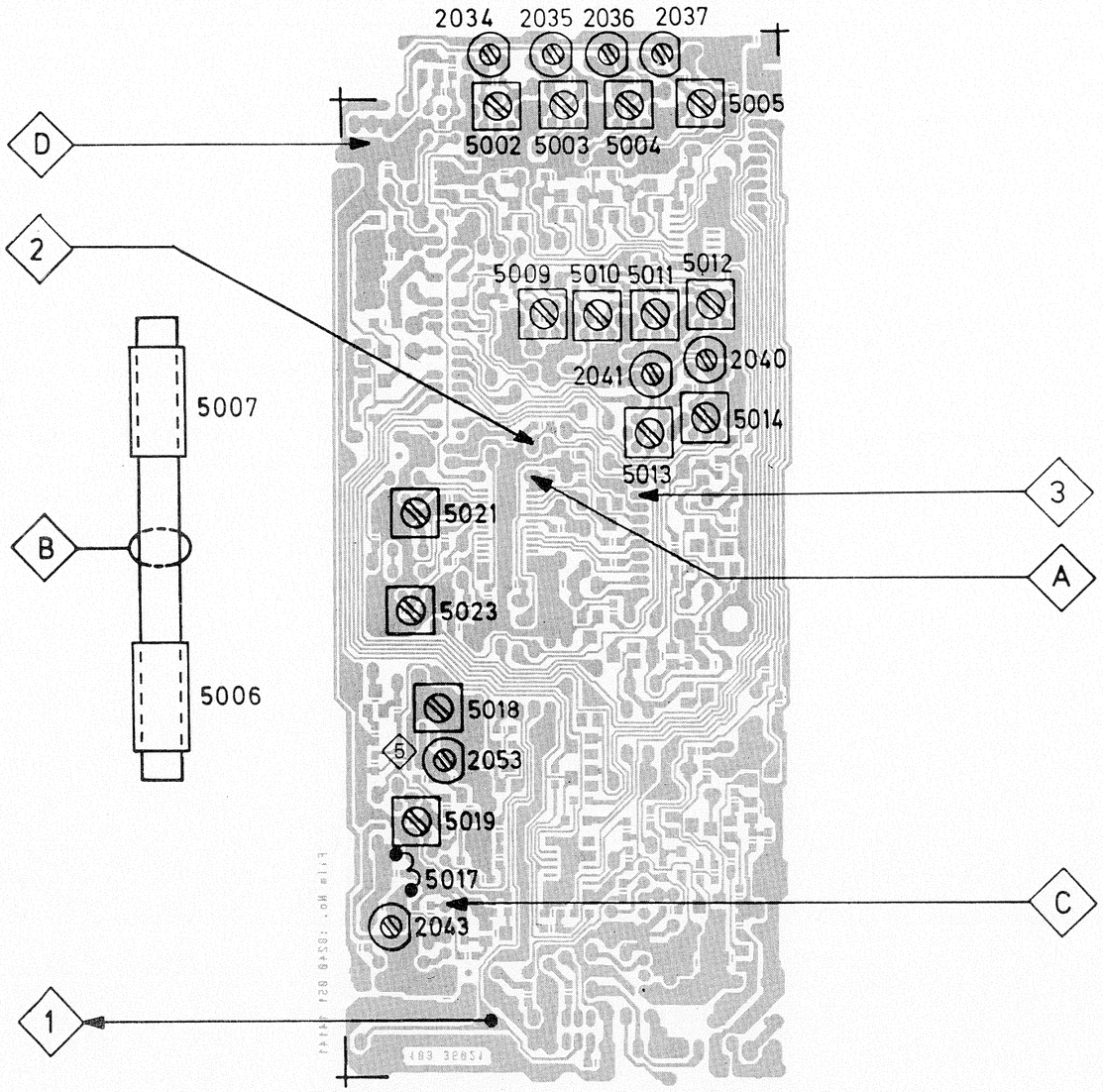
SK...	FREQUENCY	I/P	RADIO SETTING	ADJUST	O/P	SCOPE/METER
AM IF						
MW *	450 kHz	A	1620 kHz	5021	1	Max
AM RF						
MW *	520 kHz 1710 kHz	B	520 kHz 1710 kHz	5013 2040	2	↕ 1.0V ↕ 7.5V
	550 kHz 1500 kHz		550 kHz 1500 kHz	5006 2038	1	↕ Max
LW *	148 kHz 284 kHz	B	148 kHz 284 kHz	5014 2041	2	↕ 1.0V ↕ 6.2V
	160 kHz 270 kHz		160 kHz 270 kHz	5007 2039	1	↕ Max
TB	2.30 MHz 5.06 MHz	B	2.30 MHz 5.06 MHz	5014 2041	2	↕ 2.5V ↕ 7.8V
	2.60 MHz 4.00 MHz		2.60 MHz 4.00 MHz	5007 2039	1	↕ Max
SW1	7.30 MHz	D	7.30 MHz	5012	2	6.0V
	6.00 MHz 7.20 MHz		6.00 MHz 7.20 MHz	5005 2037	1	↕ Max
SW2	12.05 MHz	D	12.05 MHz	5011	2	6.5V
	9.70 MHz 11.90 MHz		9.70 MHz 11.90 MHz	5004	1	Max
SW3	17.90 MHz	D	17.90 MHz	5010	2	6.7V
	13.70 MHz 17.70 MHz		13.70 MHz 17.70 MHz	5003	1	Max
SW4	26.10 MHz	D	26.10 MHz	5009	2	7.0V
	21.60 MHz 25.90 MHz		21.60 MHz 25.90 MHz	5002	1	Max
FM IF						
FM #	10.7 MHz	C	Min.	5019	1	Symmetrical
FM RF						
FM #	87.5 MHz 108.0 MHz	D	87.5 MHz 108.0 MHz	5018 2053	3	↕ 3.1V ↕ 7.7V
	88 Mhz 106 MHz		88 MHz 106 MHz	5017 2043	1	↕ Max

* Mod. 400 Hz 30%
\# via 10 nF + 15 E

9/10 kHz switch set to 10 kHz

↕ Repeat

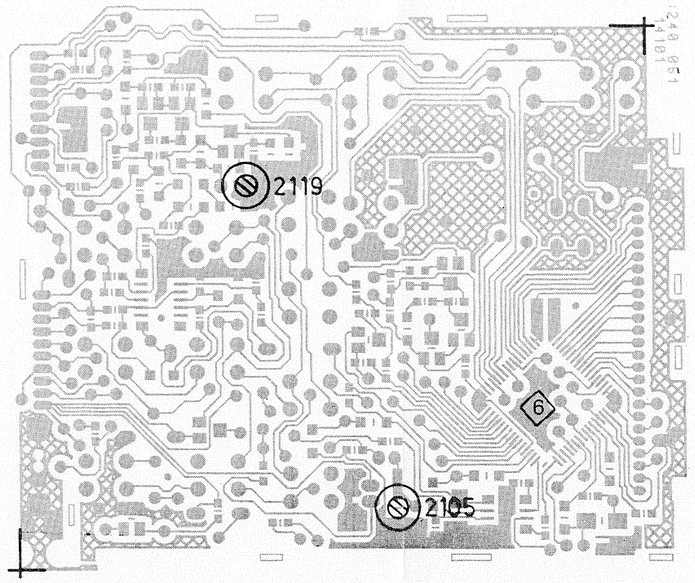
"Bei notwendigem Abgleich ist das Gerät auf die gesetzlich vorgeschriebenen Eckfrequenzen abzugleichen".



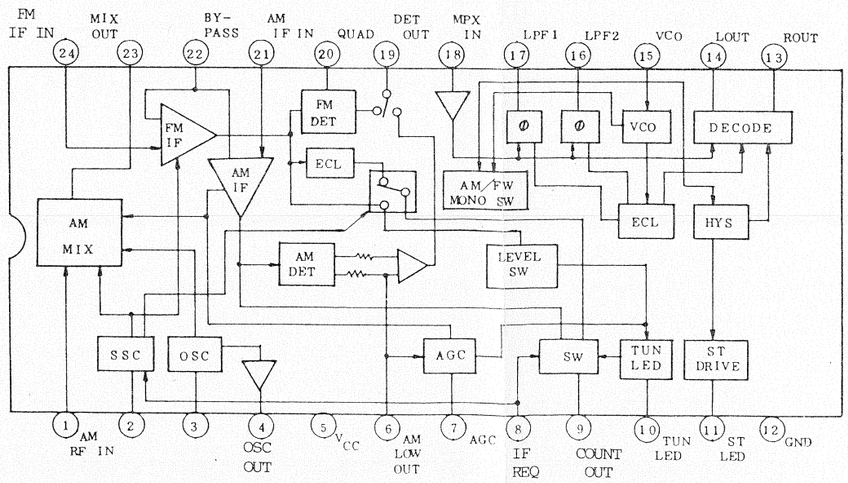
CLOCK ALIGNMENT

SK...	FREQUENCY	I/P	RADIO SETTING	ADJUST	O/P	SCOPE/METER
CLOCK FREQUENCY OSCILLATION						
FM			108 MHz	2105	◇5 *	f=118.7 MHz ± 5 kHz
DC CONVERTER FREQUENCY						
FM				2119	◇6 *	f=78 ± 0.2 MHz

* Signal picked up by : loop + 20dB buffer amplifier + frequency counter



TA8132AN



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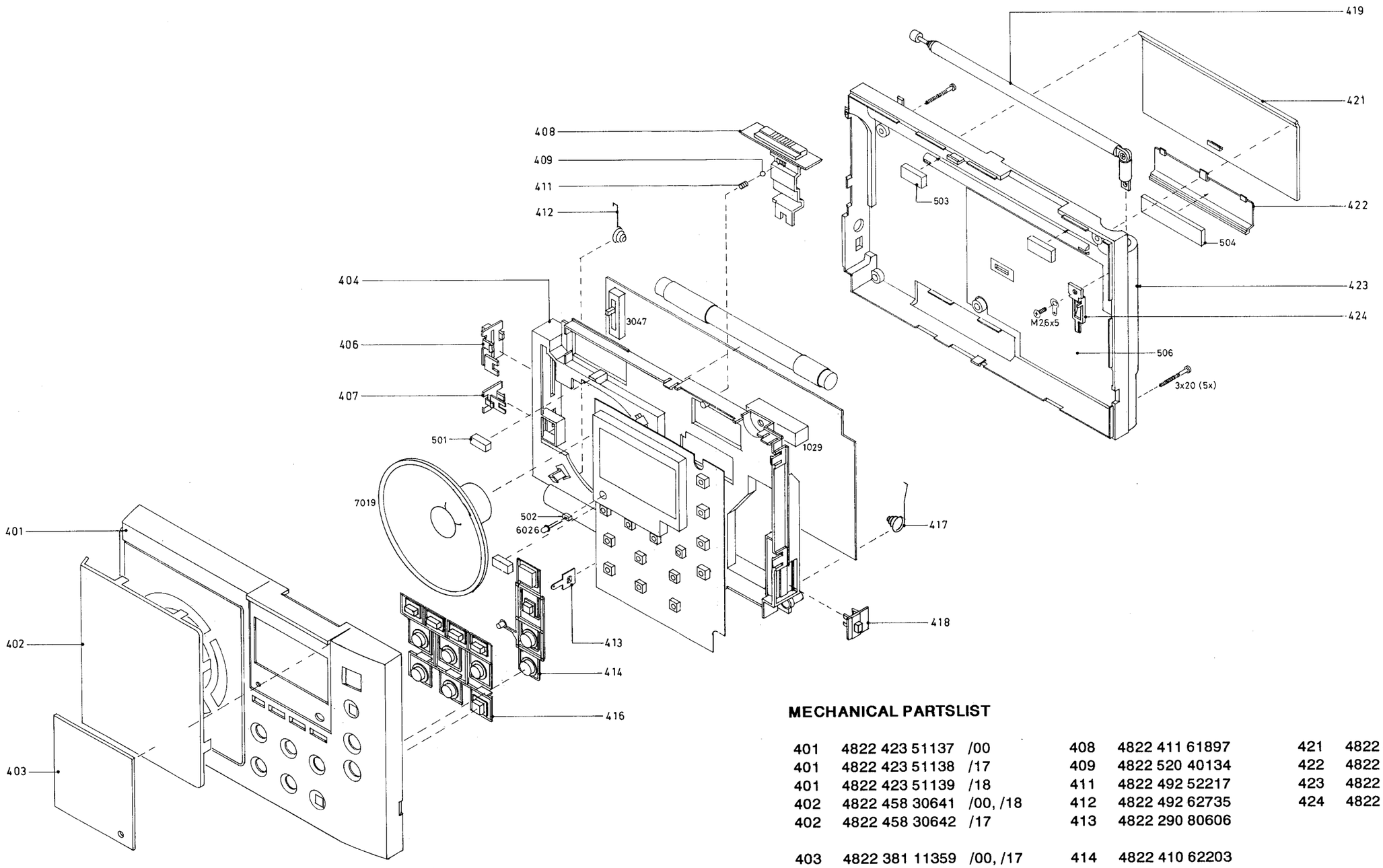
COMPONENTS LAYOUT - RADIO

| | | |

WIRING DIAGRAM

| | | |

EXPLODED VIEW DIAGRAM



MECHANICAL PARTSLIST

401	4822 423 51137	/00	408	4822 411 61897		421	4822 462 10526	
401	4822 423 51138	/17	409	4822 520 40134		422	4822 423 41204	
401	4822 423 51139	/18	411	4822 492 52217		423	4822 421 40142	
402	4822 458 30641	/00, /18	412	4822 492 62735		424	4822 423 90193	
402	4822 458 30642	/17	413	4822 290 80606				
403	4822 381 11359	/00, /17	414	4822 410 62203				
403	4822 381 11361	/18	416	4822 410 62204				
404	4822 404 10872		417	4822 290 81533				
406	4822 411 61895		418	4822 411 61898				
407	4822 411 61896		419	4822 303 30436				

Only those parts of which a service code number is stated are service parts

ELECTRICAL PARTSLIST

- IC -

7009	4822 209 31696	TC74HC86
7010	4822 209 31695	TC74HC139
7011	4822 209 72753	TA7358P
7015	4822 209 30853	TA8132AF
7018	4822 209 62192	TA7368P
7025	4822 209 31694	TC9316F
7028	4822 209 30605	TD7101F
7031	4822 209 73849	HEF4007UBT

- TRANSISTORS -

7001	4822 130 63142	2SK211-O
7002 - 7005	4822 130 63138	RN2410
7006, 7007	5322 130 42718	BFS20
7012, 7014	5322 130 42718	BFS20
7013, 7016	4822 130 63138	RN2410
7020, 7021	5322 130 60123	BC807-40
7022	5322 130 42136	BC848C
7023, 7024	4822 130 42131	BF550
7026	4822 130 63139	RN1410
7027, 7029	4822 130 63138	RN2410
7030	5322 130 42718	BFS20
7032	4822 130 63139	RN1410
7035, 7036	5322 130 42136	BC848C
7037	4822 130 63141	2SK209-GR
7041, 7043	4822 130 63138	RN2410
7042	4822 130 42131	BF550

- DIODES -

6001, 6002	4822 130 30621	1N4148
6003	4822 130 83146	BA423
6004	4822 130 30621	1N4148
6005, 6006	4822 130 83146	BA423
6007, 6008	4822 130 30621	1N4148
6009, 6010	4822 130 83146	BA423
6011, 6012	4822 130 30621	1N4148
6013, 6014	4822 130 83146	BA423
6015, 6016	4822 130 30621	1N4148
6017	4822 130 83146	BA423
6021	4822 130 83145	HN2V02H-B
6023 - 6025	5322 130 31928	BAS16
6026	4822 130 31274	LED TLR124
6027, 6028	4822 130 82833	1SV228
6029, 6030	4822 130 31983	BAT85
6031	5322 130 34834	BZX79-C3V6
6032	4822 130 34167	BZX79-C6V2
6033	4822 130 31438	1N4001
6034, 6035	5322 130 34337	BAV99
6036, 6037	4822 130 81792	RLS4148
6038, 6039	4822 130 30621	1N4148
6040, 6041	4822 130 81792	RLS4148
6042, 6043	5322 130 34337	BAV99

- COILS -

5001	4822 157 63065	Coil - choke 0.68µH
5002	4822 157 70096	Coil - SW1 ant
5003	4822 157 70099	Coil - SW2 ant
5004	4822 157 70102	Coil - SW3 ant
5005	4822 157 70103	Coil - SW4 ant
5006	4822 157 70108	Coil - MW ant
5007	4822 157 70109	Coil - TB ant
5007 *	4822 157 70111	Coil - LW ant
5008	4822 157 70118	Coil - SW coupling
5009	4822 157 70097	Coil - SW1 osc
5010	4822 157 70098	Coil - SW2 osc
5011	4822 157 70101	Coil - SW3 osc
5012	4822 157 70104	Coil - SW4 osc
5013	4822 157 70105	Coil - MW osc
5014	4822 157 70106	Coil - TB osc
5014 *	4822 157 70105	Coil - LW osc
5016	4822 242 73205	BPF - PFWB4
5017	4822 156 21671	Coil - FM ant
5018	4822 157 70092	Coil - FM osc
5019	4822 157 70093	IFT - FM
5020	4822 242 72342	Cer. filter 10.7MHz
5021	4822 157 70095	IFT - AM
5022	4822 242 81298	Cer. filter 450 kHz
5023	4822 157 70094	IFT - FM
5024, 5029	4822 157 70091	Coil - choke 100µH
5030	4822 157 70122	Coil - choke 680µH
5032	4822 157 63623	Coil - choke 0.18µH
5035	4822 157 53338	Coil - choke 1mH
5036	4822 157 70088	Coil - choke 0.56µH

- VARIABLE CAPACITORS -

2036 - 2041	4822 125 50198	Cap - trim 3p - 11p
2039 *	4822 125 50229	Cap - trim 5p - 30p
2043, 2053	4822 125 50198	Cap - trim 3p - 11p
2105	4822 125 50624	Cap - trim 5p - 30p
2119	4822 125 50625	Cap - trim 1p5 - 10p

* for -/18 LW version

- MISCELLEOUS -

1001	4822 526 10579	Ferrite bar 10x120
1002	4822 277 21633	Switch - slide 2P2T
1003	4822 267 31532	Socket - phones
1004	4822 267 31354	Socket - ext. DC
1005	4822 130 91171	LCD display
1006	4822 242 81297	X'tal res. 75 kHz
1007	4822 277 21636	Switch - slide 1P2T
1008	4822 277 21635	Switch - slide 1P2T
1009	4822 276 13308	Switch - tact
1010 - 1024	4822 276 12465	Switch - tact
1029	4822 277 21634	Switch - slide 6P4T
7019	4822 240 30643	Loudspeaker 8 ohm

ELECTRICAL PARTSLIST

- RESISTORS -

3002	4822 051 20272	Chip 2k7
3003, 3004	4822 051 20102	Chip 1k
3005	4822 051 20109	Chip 10R
3006, 3007	4822 051 20102	Chip 1k
3009, 3010	4822 051 20102	Chip 1k
3011	4822 051 20569	Chip 56R
3012, 3013	4822 051 20102	Chip 1k
3015	4822 116 83996	CF 180k 0.125W
3016	5322 116 90216	Chip 47k
3017	4822 051 20229	Chip 22R
3018	4822 051 20153	Chip 15k
3019	4822 051 20222	Chip 2k2
3021	4822 051 20681	Chip 680R
3022	5322 116 90216	Chip 47k
3023	4822 051 20271	Chip 270R
3024	4822 116 83993	CF 3k3 0.125W
3025	4822 051 20184	Chip 180k
3027 - 3029	4822 051 20223	Chip 22k
3032	4822 051 20184	Chip 180k
3033	4822 051 20101	Chip 100R
3034	4822 051 20154	Chip 150k
3035	4822 051 20102	Chip 1k
3036	4822 051 20184	Chip 180k
3038	4822 051 20184	Chip 180k
3039	4822 051 20331	Chip 330R
3040	4822 051 20229	Chip 22R
3041	4822 051 20562	Chip 5k6
3042	4822 051 20151	Chip 150R
3044	4822 051 20152	Chip 1k5
3045	4822 051 20682	Chip 6k8
3046	4822 051 20183	Chip 18k
3047	4822 105 11111	potm - slide 10kA
3048	4822 051 20392	Chip 3k9
3049	4822 116 80907	Chip 1M
3050	4822 116 83998	CF 82R 0.125W
3052	4822 051 20272	Chip 2k7
3053	4822 051 20472	Chip 4k7
3054	4822 051 20272	Chip 2k7
3055	4822 051 20822	Chip 8k2
3056	4822 051 20102	Chip 1k
3057	4822 051 20472	Chip 4k7
3058, 3059	4822 051 20103	Chip 10k
3062	4822 051 20682	Chip 6k8
3063	5322 116 90216	Chip 47k
3064	4822 051 20103	Chip 10k
3066	4822 051 20223	Chip 22k
3067	4822 051 20103	Chip 10k
3068	4822 116 80907	Chip 1M
3069	4822 051 20122	Chip 1k2
3070	4822 051 20822	Chip 8k2
3071	4822 051 20472	Chip 4k7
3072	4822 051 20104	Chip 100k
3073	4822 116 80907	Chip 1M
3074	4822 051 20335	Chip 3M3
3075	4822 051 20824	Chip 820k
3076	4822 051 20224	Chip 220k
3077		CF 470k 0.125W
3078	4822 051 20103	Chip 10k
3079	4822 116 83994	CF 10k 0.125W
3080	4822 051 20103	Chip 10k
3081	4822 051 20335	Chip 3M3
3082	4822 051 20224	Chip 220k
3083	4822 051 20223	Chip 22k
3084	4822 051 20563	Chip 56k
3104	4822 051 20472	Chip 4k7
3105	4822 051 20562	Chip 5k6
3106	4822 051 20332	Chip 3k3
3107	4822 051 20229	Chip 22R
3110	5322 116 90216	Chip 47k
3401	4822 051 20471	Chip 470R
3402	4822 051 20561	Chip 560R
3403, 3404	4822 051 20103	Chip 10k
3407	4822 051 20154	Chip 150k
3410	4822 116 83994	CF 10k 0.125W
3416	4822 051 20104	Chip 100k
3418	4822 051 20103	Chip 10k
3419	4822 051 20153	Chip 15k
3420	4822 051 20154	Chip 150k
3421	4822 116 80907	Chip 1M
3423	4822 116 83995	CF 120k 0.125W
3425	4822 116 83992	CF 100R 0.125W
3426	4822 051 20563	Chip 56k
3500	4822 051 20109	Chip 10R
3501	4822 051 20222	Chip 2k2
3505	4822 116 90379	Chip 33R
	4822 116 90384	Jumper - Chip 0805
	4822 051 10008	Jumper - Chip 1206

ELECTRICAL PARTSLIST

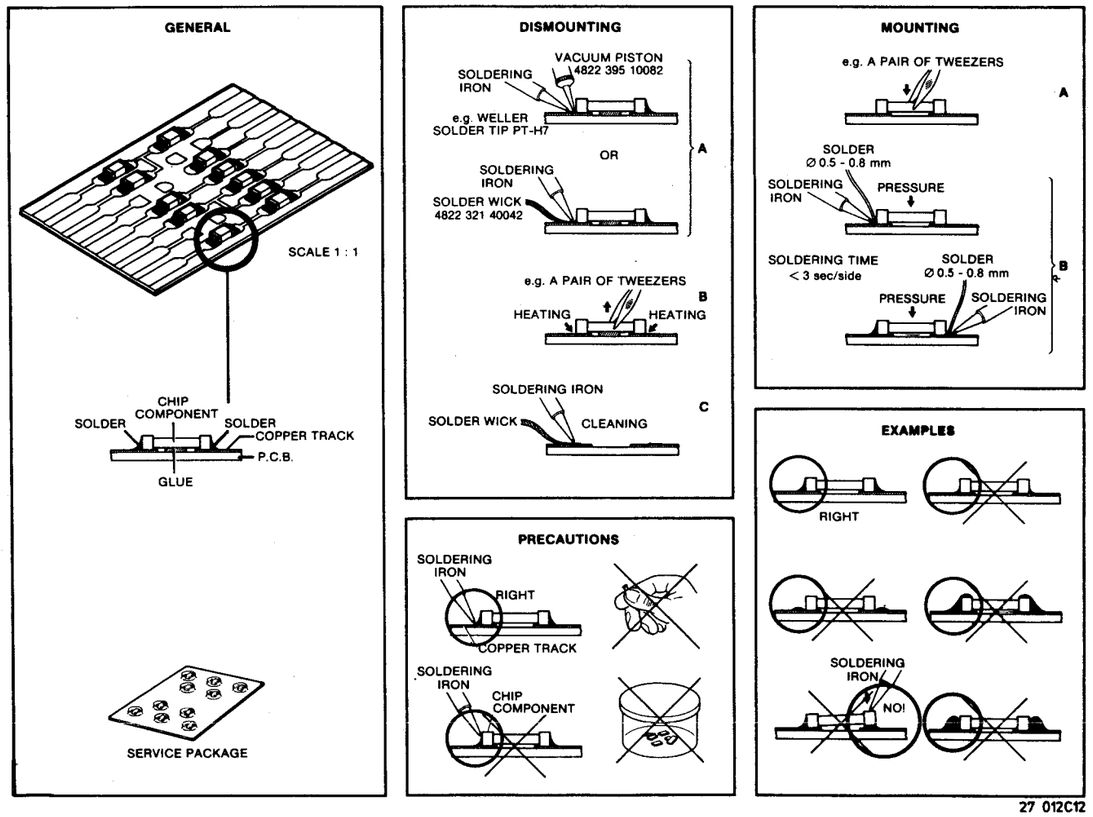
- CAPACITORS -

2001	4822 122 33175	Chip 2,2nF 10%	2064, 2065	4822 122 33797	Chip 47nF +80-20%
2002	5322 122 33869	Chip 15pF 5%	2066	4822 124 80287	470µF 16V 20%
2003	4822 122 33173	Chip 560pF 10%	2067	5322 122 31866	Chip 6,8nF 10%
2004	5322 122 32658	Chip 22pF 5%	2068	4822 122 31797	Chip 22nF 20%
2005	4822 126 10147	Chip 680pF 10%	2069	4822 124 80282	1µF 50V 20%
2006	5322 122 32659	Chip 33pF 5%	2070	4822 122 33175	Chip 2,2nF 10%
2007	4822 126 10147	Chip 680pF 10%	2071	4822 124 80284	2,2µF 35V 20%
2008	5322 122 33869	Chip 15pF 5%	2072	4822 124 80282	1µF 50V 20%
2010	5322 122 32287	Chip 4,7pF ±0.25p	2072 *	4822 124 80282	1µF 50V 20%
2010 *	4822 122 33515	Chip 82pF 5%	2073	4822 124 80287	470µF 16V 20%
2011	4822 122 31797	Chip 22nF 20%	2074	4822 124 80285	470µF 4V 20%
2012 - 2015	4822 122 33177	Chip 10nF 10%	2075	4822 124 80283	100µF 6V3 20%
2016	4822 122 31797	Chip 22nF 20%	2076	4822 124 80286	0.022F 5V5 +80-20%
2017	4822 122 33175	Chip 2,2nF 10%	2077	4822 124 80287	470µF 16V 20%
2018	4822 122 33585	Chip 3,3nF 10%	2101	4822 122 31797	Chip 22nF 20%
2019	4822 122 33174	Chip 1,5nF 10%	2102	5322 124 10802	10µF 4V 20% (T)
2020	4822 122 33176	Chip 2,7nF 10%	2103, 2104	4822 122 33797	Chip 47nF +80-20%
2021	4822 122 33514	Chip 68pF 5%	2106	4822 126 11907	Chip 33pF 5% N330
2022	4822 122 33283	Chip 150pF 5%	2108	4822 122 33177	Chip 10nF 10%
2023	4822 122 33514	Chip 68pF 5%	2109	4822 122 31797	Chip 22nF 20%
2024	5322 122 32531	Chip 100pF 5%	2110	4822 122 32442	Chip 10nF 10%
2025	4822 122 31797	Chip 22nF 20%	2111	4822 122 33837	Chip 1nF 10%
2026	5322 122 32452	Chip 47pF 5%	2112	4822 122 31947	Chip 100nF +80-20%
2027	4822 126 10052	Tub. 120pF 10%	2113	4822 126 12363	Tub. 100nF +80-20%
2028	4822 122 33175	Chip 2,2nF 10%	2114	4822 124 80283	100µF 6V3 20%
2028 *	5322 122 32268	Chip 470pF 5%	2115 - 2117	4822 122 33837	Chip 1nF 10%
2029	5322 122 32268	Chip 470pF 5%	2118	5322 122 31647	Chip 1nF 10%
2030	5322 122 32658	Chip 22pF 5%	2120	4822 126 12362	Chip 7pF ±0.5p
2030 *	5322 122 31863	Chip 330pF 5%	2121	5322 122 32658	Chip 22pF 5%
2033	4822 124 80283	100µF 6V3 20%	2122	4822 122 33177	Chip 10nF 10%
2042	5322 122 32658	Chip 22pF 5%	2123	4822 122 33496	Chip 100nF +80-20%
2044	5322 122 32967	Chip 5,6pF ±0.5p	2124	4822 122 32442	Chip 10nF 10%
2045	4822 122 31797	Chip 22nF 20%	2125	4822 122 33496	Chip 100nF +80-20%
2046	4822 122 33635	Chip 2.0pF ±0.25p	2126, 2127	4822 122 31797	Chip 22nF 20%
2047	4822 122 33837	Chip 1nF 10%	2128	5322 124 10802	10µF 4V 20% (T)
2048	4822 122 33197	Tub. 1nF 10%	2129	4822 122 33175	Chip 2,2nF 10%
2049	5322 122 33869	Chip 15pF 5%	2130	4822 122 31797	Chip 22nF 20%
2050	4822 122 33837	Chip 1nF 10%	2131		deleted
2052	4822 122 31797	Chip 22nF 20%	2132		deleted
2054	4822 121 51387	Tub. 10nF 20%	2133, 2134	5322 122 33869	Chip 15pF 5%
2055	4822 122 31797	Chip 22nF 20%	2135, 2136	4822 122 31947	Chip 100nF +80-20%
2056	5322 122 32658	Chip 22pF 5%	2138	4822 122 31797	Chip 22nF 20%
2057	4822 122 31797	Chip 22nF 20%	2139	4822 122 33837	Chip 1nF 10%
2058	4822 124 80282	1µF 50V 20%	2140	4822 122 31947	Chip 100nF +80-20%
2059	4822 122 33797	Chip 47nF +80-20%	2141	5322 122 32967	Chip 5,6pF ±0.5p
2060	4822 122 33177	Chip 10nF 10%	2141 *	5322 122 33244	Chip 8,2pF ±0.5p
2061	4822 122 33797	Chip 47nF +80-20%	2142	4822 126 10004	Chip 120pF 5%
2061 *	4822 122 33177	Chip 10nF 10%	2143	4822 122 31797	Chip 22nF 20%
2062	5322 124 41941	22µF 16V 20%	2144	4822 122 33837	Chip 1nF 10%
2063	4822 122 33837	Chip 1nF 10%	2145	4822 122 33177	Chip 10nF 10%

- CAPACITORS -

2146	4822 126 11179	Chip 6,8pF ±0.5p	2437	4822 122 31797	Chip 22nF 20%
2401	5322 122 32452	Chip 47pF 5%	2500	5322 122 32287	Chip 4,7pF ±0.25p
2403	4822 122 33177	Chip 10nF 10%	2502	4822 121 51387	Tub. 10nF 20%
2408	4822 122 31947	Chip 100nF +80-20%	2503	4822 122 31797	Chip 22nF 20%
2409	4822 126 12363	Tub. 100nF +80-20%	2505	4822 122 31765	Chip 100pF 5%
2411	4822 122 33177	Chip 10nF 10%	2506	4822 122 33177	Chip 10nF 10%
2421	4822 122 32927	Chip 100nF +80-20%	2507	5322 124 41941	22µF 16V 20%
2425	4822 124 80283	100µF 6V3 20%			
2426	4822 122 33177	Chip 10nF 10%			
2427	4822 122 33837	Chip 1nF 10%			
2429	4822 122 33837	Chip 1nF 10%			
2430	4822 126 12363	Tub. 100nF +80-20%			
2431	5322 126 10223	Chip 4,7nF 5%			
2432	4822 122 31947	Chip 100nF +80-20%			
2433	4822 122 33177	Chip 10nF 10%			

* for -/18 LW version



27 012C12

Service Information

1993-08-18

AE3625/00/17/18

A93-568

Product Service Group CE Audio

INFORMATION :

Because of the commercial request to revise many misunderstanding sentences, new D.F.U. is used.

Services code for the new D.F.U. are :
4822 736 21829 for /00, /18
4822 736 21831 for /17

SERVICE HINT :

SYMPTOM :

Removing empty ALKALINE batteries is not possible because some alkaline batteries which have a recess near the -ve pole will be stuck in the battery compartment.

CURE :

Cut a 30 to 45° chamfer at the edge of the hole (near 9/10kHz switch) of the chassis bracket as shown in Fig. 1.

REMARKS :

Parts in production are corrected from 9332 onwards.

SYMPTOM :

If the new batteries are loaded or a mains adapter is plugged-in, the set will come in a hang-up when one depresses the POWER ON switch within 10 seconds.

CURE :

Change resistor 3501 from 2.2k to 6.8k(4822 051 20682) will improve the hang-up time to less than 3 seconds.

SYMPTOM :

The set will lose its memory when it is stored in a plastic bag.

CURE :

Add a ceramic capacitor of 4.7nF (4822 552 31125) across the push switch 1009 as shown in Fig. 2 and 3, solder a wire from the metal speaker grille to PCB ground as shown in Fig. 4.

REMARKS :

Above changes will be implementd in production week 9332 onwards with factory code from 02 to 03.

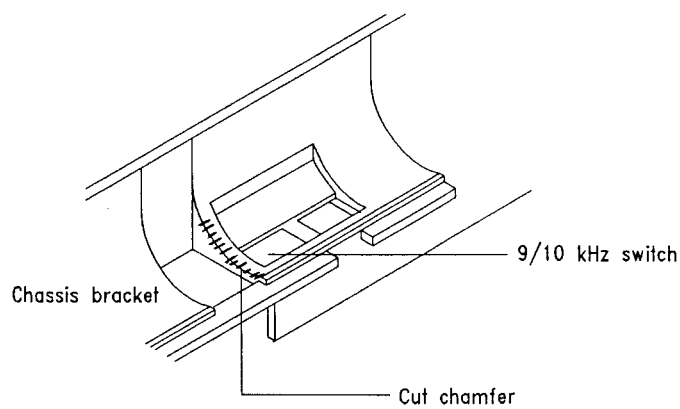


Fig. 1

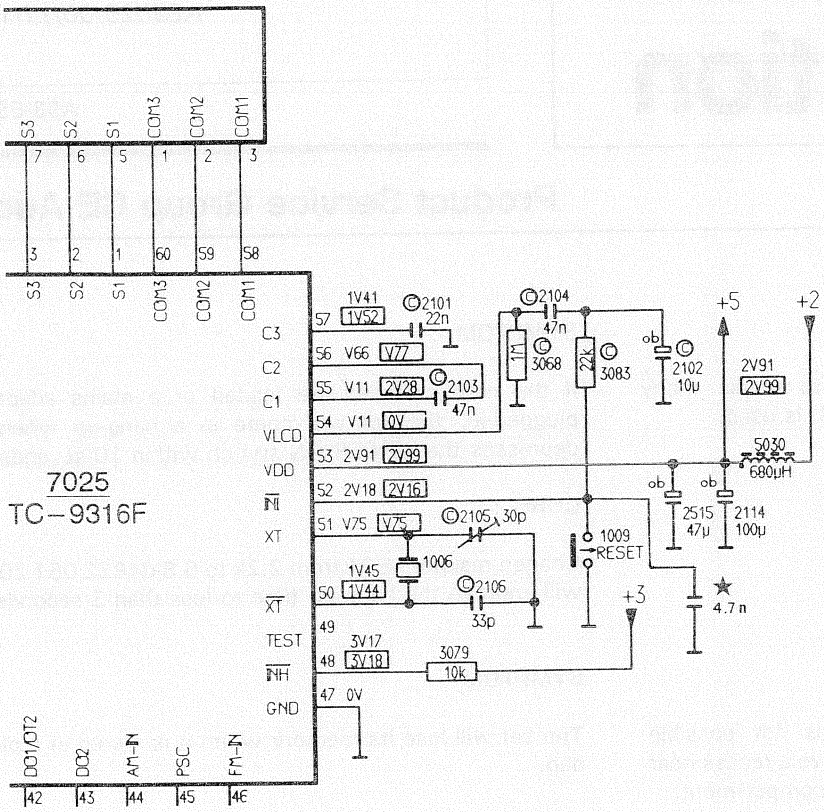


Fig. 2

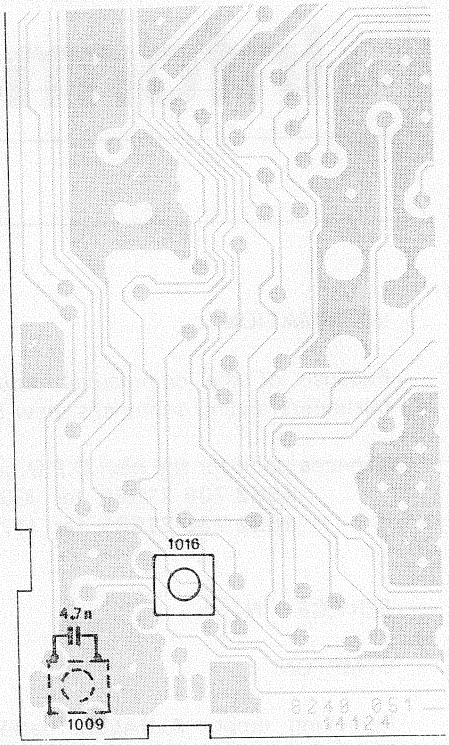


Fig. 3

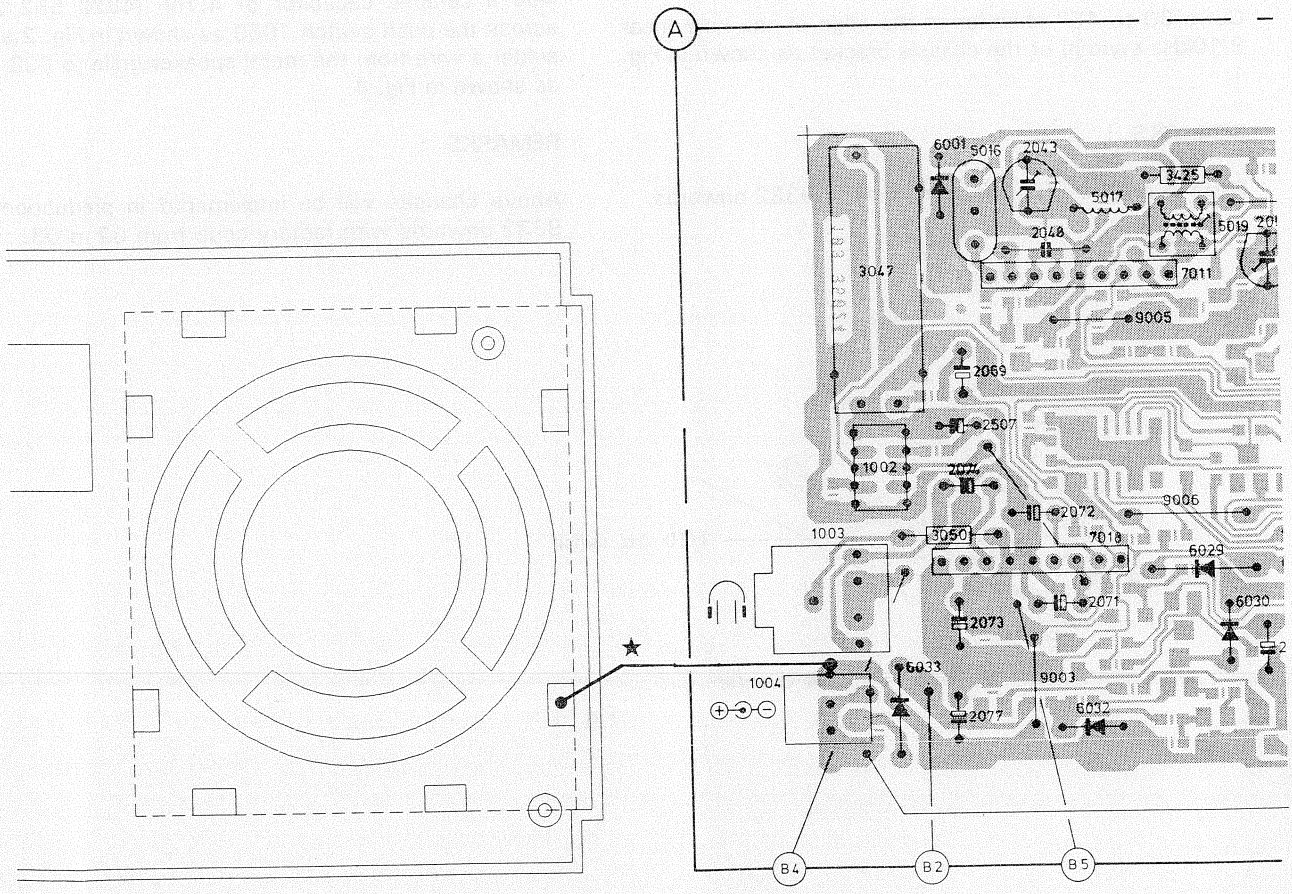


Fig. 4